International application No. PCT/KR2004/003336

## CLASSIFICATION OF SUBJECT MATTER

# IPC7 G01N 35/00, G01N 27/447, B01L 3/00, B01J 19/00, C12Q 1/68

According to International Patent Classification (IPC) or to both national classification and IPC

#### B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC7 G01N 35/00, G01N 33/48, B01J 19/00, B01D 57/02, G01N 27/26

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched Korean Patent and Applications for Inventions since 1975

Korean Utility Models and Applications for Utility Models since 1975

Japanese Utility Models and Applications for Utility Models since 1975

Electronic data base consulted during the intertnational search (name of data base and, where practicable, search terms used) eKIPASS, WPI, USPTO, PAJ, NCBI, INSPECT "particle, flow, nozzle, focusing, channel, fluid, manipulation, Microparticles, microfluidic, system, sizing, focusing, asymmetric"

## C. DOCUMENTS CONSIDERED TO BE RELEVANT

	Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
AA	х	US 6592821 B1 (Wada, H.G., et al., US) 15 Jul 2003 - see abstract and Figs 16, 23 & 28 - see column 11 line 25 ~ column 13 line 28, column 20 lines 9~25 & columns 30~33	1-5, 7-9
AC	A A	WO 02/44689 A2 (Wang, M., et al., US) 06 Jun 2002 - see page 20 & Fig 7  Proc. Natl. Acad. Sci. USA, vol.96: 11-13 (Chou, H.P., et al., US) Jan 1999 - see the whole document	1-9 1-9
B	A	WO 9800231 A1 (Parce, J.W., et al., US) 08 Jan 1998 - see abstract and claims	1-9

		Further	documents	are listed	in the	continuation	of Box	C.
--	--	---------	-----------	------------	--------	--------------	--------	----

See patent family annex.

- Special categories of cited documents:
- "A" document defining the general state of the art which is not considered to be of particular relevance
- "E" earlier application or patent but published on or after the international filing date
- "L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of citation or other special reason (as specified)
- "O" document referring to an oral disclosure, use, exhibition or other means
- "P" document published prior to the international filing date but later than the priority date claimed
- "T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
- "X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
- "Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art
- "&" document member of the same patent family

Date of the actual completion of the international search
30 MARCH 2005 (30.03.2005)

Date of mailing of the international search report

30 MARCH 2005 (30.03.2005)

Name and mailing address of the ISA/KR



Korean Intellectual Property Office 920 Dunsan-dong, Seo-gu, Daejeon 302-701, Republic of Korea

Facsimile No. 82-42-472-7140

SHIN, Weon Hye

Authorized officer

Telephone No. 82-42-481-5591



## INTERNATIONAL SEARCH REPORT

Information on patent family members

International application No. PCT/KR2004/003336

Patent document cited in search report	Publicati date		Patent family member(s)	
US 06592821 B1		AU 200050158 A1	•	
		73347 A1 23 Nov 20		
• •	EP 01.	179087 A1 13 Feb 20	002	•
	WO 20	00070080 A1 23 Nov 2	2000	
WO 200244689A2	06 Jun 2002	AU 200230530 A1	11 Jun 2002	
	EP 01:	352093 A2 15 Oct 20	03	
	JP 165	528156 A 16 Sep 200	04	
	US 20	02181837 A1 05 Dec 2	2002	
WO 9800231 A1	08 Jan 1998	AU 3499097 A1	21 Jan 1998.	
	CA 24	35204 A1 27 Nov 19	99	
	CN 12	62629 A 09 Aug 20	00.	
		145760 A2 17 Oct 20	•	
	JP 135	02790 A 27 Feb 200	D1	
		20000022329 A 25 Apr 2		
		3346 A 27 Mar 200		
	US 20	02039751 A1 04 Apr 2	002	
		30353 BA 07 Oct 20		